List of Figures

| Figure 1. Conceptual Relationships Among the Terms Harm, Significant Harm and Serious Harm | 5 |
|---|-----|
| Figure 2. Locations of Major Features in the Loxahatchee River and Estuary | |
| Figure 3. Rainfall Values, by Month, for Northern Palm Beach and Southern Martin Counties (1914–2000) | 11 |
| Figure 4. Long-term Annual Rainfall for Northern Palm Beach and Southern Martin Counties (1914–2000) | |
| Figure 5. Major Drainage Basins in the Loxahatchee River Watershed (source: FDEP, 1998) | 14 |
| Figure 6. Location of Loxahatchee Estuary macroinvertebrate sample sites used by Dent et al. 1998 | 32 |
| Figure 7. Major Features that Influence Drainage in the Loxahatchee River Basin | |
| Figure 8. Current Generalized Land Use/Land Cover in the Loxhatchee Watershed | 47 |
| Figure 9. Locations of Permitted Withdrawal Facilities within the Loxahatchee River Watershed Area | 51 |
| Figure 10. Water Use in the Loxahatchee River Watershed from Different Sources and for Different Uses | |
| Figure 11. Water Quality Stations Sampled by the Loxahatchee River District | 53 |
| Figure 12. Wild and Scenic Corridor Plant Communities within Jonathan Dickinson State Park | 54 |
| Figure 13. Loxahatchee Wild and Scenic River Corridor Classifications | 61 |
| Figure 14. Loxahatchee watershed boundary showing locations of sub-basins and 1 mile buffer | 71 |
| Figure 15. Ground water contours in the Loxahatchee watershed (April 1984). | 72 |
| Figure 16. Locations of Vegetation Survey Sites on the Northwest Fork Loxahatchee River and Kitching Creek | 92 |
| Figure 17. Relationship between the ratio of the amount of time that a station at a particular river mile along the | 3 |
| Loxahatchee River was exposed to salinities above 2ppt as a function of distance upstream from | |
| Jupiter Inlet. | |
| Figure 18. Conceptual Diagram of the Saltwater Wedge | 102 |
| Figure 19. Average Annual Daily Flows (cfs) recorded for the Lainhart Dam (1971-2001) | 106 |
| Figure 20. Flow Duration Curve for the Lainhart Dam (1971-2001) | 107 |
| Figure 21. Water Management Releases from the C-18 canal via S-46 (1990-2001) | 109 |
| Figure 22. Location of permitted projects with potential to impact flows in the C-18 Canal, Loxahatchee | |
| River or tributaries (each permit consists of a cluster of dots that represent individual wells) | 114 |
| Figure 23. Relationship between water table elevation (h _f) and the depth below ground at which saltwater | |
| intrusion occurs (Z). As ground water level increases, the depth at which intrusion occurs also | |
| increases. | 118 |
| Figure 24. Number of Observed Vascular Plant Species versus river mile, Northwest Fork of the Loxahatchee | |
| River and Kitching Creek (November 2000). | 120 |
| Figure 25. Relationship between total number of vascular plant species and location (river mile) along the | |
| Northwest Fork of the Loxahatchee River (December 2001 survey). | 121 |
| Figure 26. Total Forest Canopy Area Within Height Classes for four sites along the Northwest Fork of the | |
| Loxahatchee River. | 126 |
| Figure 27. Maps showing results of vegetation surveys along the Northwest Fork, 1985-2000. River mile | |
| locations determined by SFWMD during 2000 surveys. | 128 |
| Figure 28. Simulated salinity time series generated from the hydrodynamic/salinity model developed for the | |
| Loxahatchee River showing the salinity regime (expressed as estimated mean daily salinity) at river | |
| miles 10.2 and 9.2, Northwest Fork of the Loxahatchee River. | |
| Figure 29. Comparison of Hydrodynamic Model with Regression Analyses of Field Data. | |
| Figure 30. Location of the transect sites along the upper NW Fork of the Loxahatchee River. | |
| Figure 31. Transect 5 profile across the floodplain, upper NW Fork of the Loxahatchee River. | |
| Figure 32. Daily Stage hydrographs for the four transects sites and Lainhart Dam (1984-1990) | |
| Figure 33. Loxahatchee MFL Recovery Plan, Phases 1-3 (by 2006) | 160 |
| Figure 34. Conceptual representation of increase in flows to the Northwest Fork as projects in the | |
| NPBCCWMP and CERP are completed | 162 |